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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/823,435	03/29/2001	Victor E. Grubsky	STADM-56623	8758
24201	7590	03/29/2004	EXAMINER	
FULWIDER PATTON LEE & UTECHT, LLP HOWARD HUGHES CENTER 6060 CENTER DRIVE TENTH FLOOR LOS ANGELES, CA 90045			MOONEY, MICHAEL P	
			ART UNIT	PAPER NUMBER
			2877	

DATE MAILED: 03/29/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/823,435

Applicant(s)

GRUBSKY ET AL.

Examiner

Michael P. Mooney

Art Unit

2877

pm

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) 12-19 is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-11, 20 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____.

DETAILED ACTION

Applicant's election of claims 1-11, 20 in Paper filed 1/16/04 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)). The restriction requirement is therefore made final.

Claim Rejections - 35 USC § 102

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1- 3, 7-10 are rejected under 35 U.S.C. 102b as being anticipated by Mizrahi (5570440).

Mizrahi teaches a spectral shaping device comprising: an optical waveguide having a guiding channel surrounded by a transmissive media for guiding light energy in a guided mode; a plurality of grating sections formed in the guiding channel of the waveguide, each grating section separated by an interval less than 10 periods in length. (fig. 1).

The method of forming a device is not germane to the issue of patentability of the device itself. Therefore, the limitation "at least one of the intervals having been exposed to ultraviolet light after the plurality of gratings have been formed in the guiding channel to adjust the index of refraction of the interval" has not been given patentable weight.

Thus claim 1 is met.

Mizrahi teaches the spectral shaping device of claim 1, wherein each grating

section has the same spatial period. (col. 7 lines 8-25). Thus claim 2 is met.

Mizrahi teaches the spectral shaping device of claim 1, wherein the optical waveguide is an optical fiber, the guiding channel is a core portion of the optical fiber, and the transmissive media surrounding the core portion is a cladding layer. (col. 5 lines 5-11). Thus claim 3 is met.

By the reasons and references given above each and every element of claims 7-10 are taught by Mizrahi. Thus claims 7-10 are met.

Claim 6 is rejected under 35 U.S.C. 102b as being anticipated by Canning et al. (5830622).

Canning et al. teaches a spectral shaping device comprising: an optical waveguide having a guiding channel surrounded by a transmissive media for guiding light energy in a guided mode; a plurality of grating sections formed in the guiding channel of the waveguide, each grating section separated by an interval less than 10 periods in length, at least one of the intervals having been exposed to ultraviolet light after the plurality of gratings have been formed in the guiding channel to adjust the index of refraction of the interval; wherein each rating section has a peak index change, and the peak index change of each grating section is approximately equal. (Fig. 1; col. 2 lines 42-52; Abstract).

Thus claim 6 is met.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

Claims 4-5, 11, 20 are rejected under 35 U.S.C. 103a as being unpatentable over Mizrahi (5570440).

Mizrahi teaches a coupler for coupling co-propagating guided modes of an optical waveguide, comprising: an optical Waveguide having a guiding channel surrounded by a transmissive media for guiding light energy in a guided mode; a plurality of grating sections formed in the guiding channel of the waveguide, each mating section separated by an interval, at least one of the intervals having been exposed to ultraviolet light to adjust the index of refraction of the interval. Furthermore, Mizrahi teaches wherein the waveguide is an optical fiber having core portion and a cladding layer. (fig. 1; col. 5 lines 5-11; col. 7 lines 8-25).

Although Mizrahi does not explicitly state the coupler “wherein the grating sections couple light between guided modes in the core and cladding layer” it would have been obvious to do so because it is notoriously well known (NWK) that grating sections couple light between guided modes in the core and cladding layer in such arrangements.

Thus claim 11 is rejected.

By the reasoning and references given above each and every element of claims 4-5, 20 are rendered obvious under Mizrahi. Thus claims 4-5, 20 are rejected.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michael P. Mooney whose telephone number is 571-272-2422. The examiner can normally be reached during weekdays, M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner’s supervisor, Frank G. Font can be reached on 571-272-2415. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 2877

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 571-272-

1562.



Michael P. Mooney
Examiner
Art Unit 2877



Frank G. Font
Supervisory Patent Examiner
Art Unit 2877

FGF/mpm
3/22/04